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What is claimed is:

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1. Paperboard having improved resistance to moisture migration, comprises a paperboard furnish, 5-60 lbs of alum per ton of furnish, 3-40 lbs of size per ton of furnish, and 16-50 lbs of cationic starch per ton of furnish.

2. Paperboard as in claim 1, wherein said furnish comprises 25-70 percent doubleliner Kraft, 25-70% recycled paperboard containers, and 30-50% core waste.

3. Paperboard as in claim 2, having a freeness of 150-270 csf.

4. Paperboard as in claim 1 further comprising 2-8 lbs of dry strength agent per ton of furnish.

5. Paperboard as in claim 1, further comprising 0.2-1. lb of microparticle silica per ton of furnish.

- 6. Paperboard having improved strength and resistance to moisture migration, comprises a paperboard furnish, 4-40 lbs of alum per ton of furnish, 3-12 lbs of size per ton of furnish, and 30-40 lbs of cationic starch per ton of furnish.
- 7. Paperboard as in claim 6, wherein said furnish comprises 25 70 percent doubleliner Kraft, 25-70% recycled paperboard containers, and 30 50% core waste.
- 8. Paperboard as in claim 6, the paperboard having a water 30 absorption of less than 400 cgs.

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9. Paperboard as in claim 6 further comprising 2-8 lbs of dry strength agent per ton of furnish.

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- 10. Paperboard as in claim 6, further comprising 0.2-1. lb of microparticle silica per ton of furnish.
- 11. Paperboard as in claim 9, wherein said alum is about 4-12 lbs per ton of furnish.
  - 12. A high strength, dimensional stable paperboard core, comprising a plurality of spirally wound paperboard plies, said paperboard comprising a paperboard furnish, 5-60 lbs of alum per ton of furnish, 3-40 lbs of size per ton of furnish, and 16-50 lbs of cationic starch per ton of furnish.
  - 13. A core as in claim 12, wherein said paperboard further comprises 2-8 lbs of dry strength agent per ton of furnish.
- 20 14. A core as in claim 12 wherein said paperboard further comprises 0.2-1. lb of microparticle silica per ton of furnish.
- 15. A high strength, dimensional stable paperboard core, comprising a plurality of spirally wound paperboard plies, said paperboard comprising a paperboard furnish comprised of 25-70 percent doubleliner Kraft, 25-70% recycled paperboard containers and 30-50% core waste; 5-60 lbs of alum per ton of furnish; 3-40 lbs of size per ton of furnish; and 16-50 lbs of cationic starch per ton of furnish; said paperboard having a water absorption of less than 400cgs.

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